

FACT SHEET Arsenic and Seattle's Drinking Water Supplies

Revised May 8, 2006

Summary

Testing of Seattle's sources of drinking water indicate that arsenic is not present above 1 microgram per liter (ug/L), Seattle's detection limit, for either the Tolt or Cedar supplies. The new standard is much lower - 10 ug/L, than the old standard - 50 ug/L. Even under the new standard, Seattle easily meets the requirement.

Arsenic Sources and Levels in Seattle's Water

Seattle Public Utilities has been testing the water system for many inorganic parameters including arsenic since 1977. Although regulations only require annual monitoring at the sources for our system, we have tested quarterly at multiple locations including two sites within the distribution system. The reported results were non-detectable with the detection limit of 10 micrograms per liter (ug/L) until 1990. In the early 1990s, more sensitive methods allowed instruments to detect as low as 5 ug/L and sample results continued to be below detection. By 1995, newer techniques and instruments allowed detection as low as 1 ug/L and sample results continued to be below this level. In 2003, SPU purchased a new instrument that could detect concentrations less that 1 ug/L and results ranged from 0.3 to 0.7 ug/L. These values are significantly below the previous regulatory limit of 50 ug/L and well below the new Maximum Contaminant Level of 10 ug/L that became effective in 2006. Arsenic levels in Seattle's blended groundwater are generally in the 1-2 ug/L range. Prior to blending, the groundwater has arsenic levels of 3-5 ug/L (still below the standard). The groundwater is always blended when used, for a number of reasons, and it is only used every few years.

Setting a New Health Standard

- Arsenic occurs naturally in the environment in the earth's crust.
- Arsenic is also a byproduct of many industrial activities. Fortunately, industrial sources of arsenic are not present in Seattle's watersheds.
- The most common exposure routes are the consumption of food and water.
- The new arsenic standard became effective on January 23, 2006.
- If you would like more information about the EPA rule on arsenic, go to: http://www.epa.gov/OGWDW/arsenic/regulations.html

Questions?

Contact Water Quality at 206-615-0827 or mailto:drinkingwater.quality@seattle.gov